

ENERGY STAR Appliances: 2001 Market Forecast

This document outlines the market for ENERGY STAR appliances, current and anticipated, to assist market transformation partners make better informed decisions regarding the timing and types of ENERGY STAR appliance promotions they offer in 2001. Given the anticipated changes in federal and ENERGY STAR specifications, many partners expressed concern about the availability and pricing of models in the coming year. This summary includes information about:

- product availability for current and anticipated ENERGY STAR qualified appliances (clothes washers, dishwashers, refrigerators, and room air conditioners);
- timing of new federal and ENERGY STAR specifications for these appliances;
- price points for qualified appliances;
- manufacturer labeling of anticipated qualified appliances; and
- distribution of anticipated qualified appliances.

The data describing currently available products that meet federal standards and that are ENERGY STAR qualified comes from the qualified product lists on the ENERGY STAR web site (www.energystar.gov). These lists will be updated as manufacturers confirm specific information about new qualifying products. ENERGY STAR manufacturer partners provided information about additional qualified products that will be available in 2001. To preserve the confidentiality of this sensitive information, all product forecasts generously provided by partners have been aggregated. Manufacturer- or brand-specific information cannot be released until companies make this information public. Price information was gathered by D&R International and NPD Intellect. All product information was effective on November 17, 2000.

Current Market for ENERGY STAR qualified Appliances

According to a report by the Four Winds Alliance, the overall market for appliances has slowed since 1991.ⁱ From 1994 to 1998, dishwasher sales increased 12.3 percent compared to 44 percent between 1991 and 1994. For 1999 and 2000, steady growth was predicted for dishwashers. Refrigerator sales climbed slowly between 1991 to 1998 with a small increase predicted in 1999 and 2000. Sales of clothes washers increased steadily between 1991 and 1994, and then experienced some unsteady growth and decline through 1998. A jump in clothes washer sales was predicted in 1999 with little change in 2000.

Despite the expected small increases in sales of appliances, retail sales of ENERGY STAR qualified appliances increased overall by about 31 percent between January and September 2000, according to NPD Intellect.ⁱⁱ Qualified clothes washer sales increased 11 percent, while qualified dishwasher and room air conditioner sales both increased 66 percent. At the same time, sales of qualified refrigerators declined by 5 percent.

Product Availability

Currently Available Appliances that Meet the Current Federal and ENERGY STAR Standards

	Meet Current Federal Standard		Meet Current ENERGY STAR Specs	
	Number of models	Number of brands	Number of models	Number of brands
Room Air Conditioners	296	29	32	8
Dishwashers	818	38	265	25
Clothes washers	567	42	64	18
Refrigerators	2,933 (includes small models)	56	301	14

Note: Models meeting the former ENERGY STAR specification may not be sold as ENERGY STAR qualified unless that particular model is labeled with a permanent logo or has a logo on the EnergyGuide label. If the model meets this labeling requirement, a retailer can still label and a utility can still recognize that model as qualified until June 1, 2001, when DOE will reassess the appliance market. DOE and EPA will ensure that product lists clearly identify which models meet the old and which meet the new ENERGY STAR specifications. (See September 12, 2000 letter from Bill Noel of DOE for more information.)

Currently Available Appliances that Meet the New Federal and ENERGY STAR Standards

	Meet New Federal Standard		Meet New ENERGY STAR Specs	
	Number of models	Number of brands	Number of models	Number of brands
Room Air Conditioners	296	29	32	8
Dishwashers	818	38	158	23
Clothes washers *	567	42	64	18
Refrigerators	52	8	0	0

* Clothes washers refer to current federal standards and specifications. The new ENERGY STAR clothes washer spec is very similar to the current ENERGY STAR clothes washer spec; so at this time, no clothes washer models will be affected.

Size ranges of currently available ENERGY STAR qualified room air conditioners

< 6,000 BTU/hour	6 models
6,000 – 7,999 BTU/hour	7 models
8,000 – 13,999 BTU/hour	8 models
14,000 – 19,999 BTU/hour	6 models
20,000+ BTU/hour	5 models

Timing of New Standards and Specifications

Appliance	Effective date of new federal standards	Effective date of new ENERGY STAR specifications
Refrigerators	July 1, 2001	January 1, 2001
Clothes Washers	not changing until 2004	January 1, 2001
Dishwashers	not changing	January 1, 2001
Room Air Conditioners	already in effect as of October 1, 2000	already in effect as of October 1, 2000

Anticipated Appliance Market in 2001

According to the Four Winds Alliance report, the markets for clothes washers, dishwashers, and refrigerators are expected to grow slowly from 2000 to 2005. Refrigerator sales are expected to grow 9 percent between 1998 and 2005. From 1999-2005, national sales of qualified clothes washers are expected to slow to 3.5 percent. The forecast is for continued strong dishwasher sales beyond 2000 to 2005.

Product Availability

Based on information received from manufacturer partners as of 11/14/00, additional new product models can be expected in 2001 that meet new ENERGY STAR specifications as summarized in the table below. Not all manufacturers have provided data at this time; additional qualifying models are expected as more responses are received. As information about qualified products is confirmed, the web-base qualified products list will be updated.

	Additional ENERGY STAR models expected	Total known models (current + expected)	Timing of market introduction
Room A/C	20	51+	Q1
Dishwashers	47	199	Most in Q2
Clothes washers	11	79	Spring-Fall
Refrigerators	70	70	15+ in Q1, most in Q2

Size ranges for new room air conditioner models (not all manufacturers provided size details)

< 6,000 BTU/hour	3+ models
6,000 – 7,999 BTU/hour	? models
8,000 – 13,999 BTU/hour	1+ models
14,000 – 19,999 BTU/hour	4+ models
20,000+ BTU/hour	1+ model

Configurations for new refrigerator models

Top-mount (14 ft ³ - 26 ft ³)	23+ models
Side-by-side (22 ft ³ - 26 ft ³)	39+ models

Labeling

Nearly every manufacturer who participated in these discussions expressed the intent to label their products on the EnergyGuide label, and about half intend to use permanent labels directly on their ENERGY STAR qualified appliances. Updated partnership agreements currently under revision at EPA/DOE will require manufacturers in most product categories to label their products (use of the logo on the EnergyGuide label meets this requirement) and to use the logo and explanatory information in product manuals as applicable.

Retail partners such as Sears and Best Buy will continue to designate qualified products through model-specific product cards on the retail floor.

Product Distribution

All manufacturers who responded to the question about product distribution indicated that they would offer their products nationally at the earliest possible date. Rebates and other incentives will not affect timing or distribution of product introductions.

Price Premiums for Qualified Appliances

Qualified Room Air Conditioners in 2000

Early in 2000, D&R International selected ten compliant room air conditioner models from its ENERGY STAR product database and attempted to locate corresponding non-compliant models in order to compare the prices between them. Of the 10 models selected, D&R identified seven with similar non-compliant models. Similar models were defined as those with the same relative cooling capacity (measured in BTUs) and manufacturer/brand.

Price point comparisons between ENERGY STAR compliant and non-compliant room air conditioner models are difficult. Among the models D&R compared, the change in manufacturer suggested retail price (MSRP) for non-compliant vs. compliant models ranged from zero to \$100. According to product information available online for these seven comparisons, the difference in cost between compliant and non-compliant room air conditioners appears to have little to do with energy consumption or efficiency. Quieter operation, electronic controls and digital timers are some of the additional features that manufacturers highlight when describing the more expensive, ENERGY STAR compliant room air conditioners.

Qualified Appliances in 2001

No manufacturer partners could provide specific information about anticipated price premiums for ENERGY STAR qualified models in 2001. Some indicated that their ENERGY STAR qualified models incorporate a range of features and technologies (electronic touch pads, remote controls for air conditioners, added insulation for noise reduction and efficiency, and specialty features for refrigerators) that when combined, may place these products in the higher end of the category's price range. Some prices have yet to be determined, and will be based on retail buying decisions and level of consumer demand.

Several retail and manufacturer partners have indicated that they will offer ENERGY STAR qualified refrigerators at nearly the same price levels as in 2000 (with a possible increase of \$50-100).

NPD Intellect Market Tracking reported that the average price of ENERGY STAR qualified appliances was more than the average price of non-qualified appliances for the period January through September 2000: 7 percent more for dishwashers; 9 percent more for room air conditioners; 129 percent more for clothes washers; and 72 percent more expensive for refrigerators. NPD collects from panels representing the appliance industry's key retail and business-to-business distribution channels, including all of the major manufacturers, retailers and business-to-business sellers in the appliance industry.

ⁱ "Opportunities for New Appliance Market Transformation Programs in the Northwest", prepared by Four Winds Alliance and D&R International, Ltd. for the Northwest Energy Efficiency Alliance. August 2000.

ⁱⁱ "NPD Intellect Reports Significant Growth for Energy-Efficient Appliances" press release. Port Washington, NY. October 18, 2000.